

ENHANCED CHANNEL ACCESS MECHANISMS FOR AN HPNA NETWORK

ABSTRACT OF THE DISCLOSURE

A method and a system is disclosed for providing access in a centralized manner to a communications medium that is suitable for allowing use of a plurality of Home Phoneline Network Association (HPNA) v2 frames. A plurality of messages are transmitted between a first enhanced station and a second enhanced station. Each transmitted message is transmitted in an enhanced frame that has timing to allow an Inter-Frame Gap (IFG). A blocking signal, such as a sine wave signal and a cosine wave signal, is transmitted during at least one IFG between enhanced frames to mask the presence of the IFG to a non-enhanced STA. Alternatively, the blocking signal can be transmitted during at least one reply message. Contention-free access to the communications medium is also provided by transmitting messages in a highest priority level available in an HPNA v2 frame.